

# PATENT COOPERATION TREATY

## PCT

### INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY (Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44bis)

Applicant's or agent's file reference P1452PCT	FOR FURTHER ACTION		See item 4 below
International application No. PCT/JP2004/008680	International filing date (day/month/year) 15 June 2004 (15.06.2004)	Priority date (day/month/year) 16 June 2003 (16.06.2003)	
International Patent Classification (8th edition unless older edition indicated) See relevant information in Form PCT/ISA/237			
Applicant KOBELCO CONSTRUCTION MACHINERY CO., LTD.			

1. This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 bis.1(a).
2. This REPORT consists of a total of 5 sheets, including this cover sheet.  
  
In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.

3. This report contains indications relating to the following items:

- |                                     |              |   |
|-------------------------------------|--------------|---|
| <input checked="" type="checkbox"/> | Box No. I    | Basis of the report   |
| <input type="checkbox"/>            | Box No. II   | Priority  |
| <input type="checkbox"/>            | Box No. III  | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability  |
| ⇒ <input type="checkbox"/>          | Box No. IV   | Lack of unity of invention  |
| <input checked="" type="checkbox"/> | Box No. V    | Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement |
| <input type="checkbox"/>            | Box No. VI   | Certain documents cited   |
| <input type="checkbox"/>            | Box No. VII  | Certain defects in the international application  |
| <input type="checkbox"/>            | Box No. VIII | Certain observations on the international application   |

4. The International Bureau will communicate this report to designated Offices in accordance with Rules 44bis.3(c) and 93bis.1 but not, except where the applicant makes an express request under Article 23(2), before the expiration of 30 months from the priority date (Rule 44bis.2).

The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland  Facsimile No. +41 22 740 14 35 Form PCT/IB/373 (January 2004)	Date of issuance of this report 24 April 2006 (24.04.2006)
	Authorized officer  Masashi Honda  Telephone No. +41 22 338 70 10

From the INTERNATIONAL BUREAU

**PCT**

NOTIFICATION OF TRANSMITTAL  
OF COPIES OF TRANSLATION  
OF THE INTERNATIONAL PRELIMINARY REPORT  
ON PATENTABILITY  
(CHAPTER I OR CHAPTER II  
OF THE PATENT COOPERATION TREATY)  
(PCT Rules 44bis.3(c) and 72.2)

To:

KOTANI, Etsuji  
Nishimen Building 2nd Floor  
2-2, Nakanoshima 2-chome  
Kita-ku, Osaka-shi  
Osaka 5300005  
JAPON

Date of mailing (day/month/year) 04 May 2006 (04.05.2006)	
Applicant's or agent's file reference P1452PCT	IMPORTANT NOTIFICATION
International application No. PCT/JP2004/008680	International filing date (day/month/year) 15 June 2004 (15.06.2004)
Applicant KOBELCO CONSTRUCTION MACHINERY CO., LTD. et al	

## 1. Transmittal of the translation to the applicant.



The International Bureau transmits herewith a copy of the English translation of the international preliminary report on patentability (Chapter I).



The International Bureau transmits herewith a copy of the English translation of the international preliminary report on patentability (Chapter II).

## 2. Transmittal of the copy of the translation to the designated or elected Offices.

The International Bureau notifies the applicant that copies of that translation have been transmitted to the following designated or elected Offices requiring such translation:

None

The following designated or elected Offices, having waived the requirement for such a transmittal at this time, will receive copies of that translation from the International Bureau only upon their request:

AE, AG, AL, AM, AP, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EA, EC, EE, EG, EP, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OA, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW

## 3. Reminder regarding translation into (one of) the official language(s) of the elected Office(s).

The applicant is reminded that, where a translation of the international application must be furnished to an elected Office, that translation must contain a translation of any annexes to the international preliminary report on patentability (Chapter III).

It is the applicant's responsibility to prepare and furnish such translation directly to each elected Office concerned within the applicable time limit (Rule 74.1). See Volume II of the PCT Applicant's Guide for further details.

The International Bureau of WIPO  
34, chemin des Colombettes  
1211 Geneva 20, Switzerland

Authorized officer

Masashi Honda

Facsimile No. +41 22 740 14 35

Facsimile No. +41 22 338 70 10

Form PCT/IB/338 (January 2004)

# PATENT COOPERATION TREATY

TRANSLATION

From the  
INTERNATIONAL SEARCHING AUTHORITY

PCT

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43bis.1)

To:

Date of mailing  
(day/month/year)

Applicant's or agent's file reference  
**P1452PCT**

FOR FURTHER ACTION

See paragraph 2 below

International application No.  
**PCT/JP2004/008680**

International filing date (day/month/year)  
**15.06.2004**

Priority date (day/month/year)  
**16.06.2003**

International Patent Classification (IPC) or both national classification and IPC

Applicant

**KOBELCO CONSTRUCTION MACHINERY CO., LTD.**

1. This opinion contains indications relating to the following items:

- ☒ Box No. I Basis of the opinion
- ☐ Box No. II Priority
- ☐ Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- ☐ Box No. IV Lack of unity of invention
- ☒ Box No. V Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- ☐ Box No. VI Certain documents cited
- ☐ Box No. VII Certain defects in the international application
- ☐ Box No. VIII Certain observations on the international application

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(b) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

Name and mailing address of the ISA/IP

Authorized officer

Facsimile No

Telephone No.

Form PCT/ISA/237 (cover sheet) (January 2004)

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/JP2004/008680

Box No. 1

Basis of this opinion

1. With regard to the language, this opinion has been established on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.  
☐ This opinion has been established on the basis of a translation from the original language into the following language \_\_\_\_\_, which is the language of a translation furnished for the purposes of international search (under Rule 12.3 and 23.1(b)).
2. With regard to any nucleotide and/or amino acid sequence disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
  - a. type of material  
☐ a sequence listing  
☐ table(s) related to the sequence listing
  - b. format of material  
☐ in written format  
☐ in computer readable form
  - c. time of filing/furnishing  
☐ contained in the international application as filed.  
☐ filed together with the international application in computer readable form.  
☐ furnished subsequently to this Authority for the purposes of search.
3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table(s) relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
4. Additional comments:

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.  
PCT/JP2004/008680

Box No. V	Reasoned statement under Rule 43bis.1(ii)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement		
1. Statement			
Novelty (N)	Claims	1-18	YES
	Claims		NO
Inventive step (IS)	Claims		YES
	Claims	1-18	NO
Industrial applicability (IA)	Claims	1-18	YES
	Claims		NO
2. Citations and explanations:			
Document 1:	JP 8-277713 A (Hitachi Construction Machinery Co., Ltd.), 22 October 1996, Fig. 1		
Document 2:	CD-ROM of the specification and drawings annexed to the request of Japanese Utility Model Application No. 58/1993 (Laid-open No. 53250/1994) (Toyo Umpani Co., Ltd.), 19 July 1994, paragraphs 0002-0004; Fig. 3		
Document 3:	JP 11-82055 A (Hitachi Construction Machinery Co., Ltd.), 26 March 1999, Figs. 1-8		
Document 4:	Microfilm of the specification and drawings annexed to the request of Japanese Utility Model Application No. 39543/1990 (Laid-open No. 1626/1992) (Komatsu, Ltd.), 08 January 1992, Page 2, lines 13-17; Fig. 3		
Document 5:	JP 9-195771 A (Sumitomo Construction Machinery Co., Ltd.), 29 July 1997, Fig. 1		
Document 6:	Microfilm of the specification and drawings annexed to the request of Japanese Utility Model Application No. 55200/1971 (Laid-open No. 87302/1975) (Komatsu, Ltd.), 24 July 1975, Full text; Figs. 1-2		
<p>The inventions of claims 1-4, 11, and 12 do not appear to involve an inventive step based on documents 1 and 2 cited in the ISR.</p> <p>Because the problem of preventing the leakage of noise for a cooling air intake opening is obviously similar to the case of a cooling air discharge opening, the application of decreasing the external leakage of rotation sound of the cooling fan or the like by providing the cooling air outlet offset from the radiator ventilation surface to the cooling air intake opening in the device of document 1 would be easy for a person skilled in the art.</p> <p>The direction of the offset, the degree of the offset, and whether there is a counterweight are matters that would be appropriately selected by a person skilled in the art.</p>			

Form PCT/ISA/237 (Box No. V) (January 2004)

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/JP2004/008680

Supplemental Box

In case the space in any of the preceding boxes is not sufficient.

Continuation of: Box V

The inventions of claims 5-8 do not appear to involve an inventive step based on documents 1-3 cited in the ISR.

Since providing cooling air intake openings by dispersion at a plurality of locations is common technology (document 3, for example), the application of such technology to the device in document 1 would be easy for a person skilled in the art.

The inventions of claims 9 and 10 do not appear to involve an inventive step based on documents 1-4 cited in the ISR.

Applying the matter of providing a sound-insulating board at the cooling air route described in document 4 to the device of document 1 would be easy for a person skilled in the art. The matter of providing a sound-absorbent material to the cooling air route is also commonly known technology (document 2, for example).

The inventions of claims 13, 14, and 16-18 do not appear to involve an inventive step based on documents 1, 2, and 5 cited in the ISR.

Since a duct for guiding cooling air from a cooling air intake opening to a heat exchanger is commonly known technology (document 5, for example), the application of that technology to the device of document 1 would be easy for a person skilled in the art.

The invention of claim 15 does not appear to involve an inventive step based on documents 1, 2, 5, and 6 cited in the ISR.

Applying the matter of providing a muffler at a cooling air intake opening described in document 6 to the device in document 1 would be easy for a person skilled in the art.